

What is claimed is:

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1. A specified position determining method applied to a game apparatus, comprising the steps of:

generating map data to display a map image on a display of the game apparatus, the map image two-dimensionally expressing a corresponding three-dimensional map which includes information representing a predetermined three-dimensional field;

generating cursor data to display a cursor on the displayed map image;

controlling a position of the displayed cursor in accordance with an instruction from an operator;

virtually disposing the three-dimensional map in parallel to the map image at a backward position thereof seeing from a predetermined viewpoint, such that straight lines extending from the predetermined viewpoint to given points on a peripheral edge of the map image further pass through corresponding points on a peripheral edge of the three-dimensional map;

projecting the predetermined viewpoint onto the three-dimensional map via a position of the cursor displayed on the map image; and

detecting a point on the three-dimensional map where the projected viewpoint intersects the predetermined three-dimensional field, whereby determining the detected point as a position where the cursor specifies on the displayed map image.

2. The specified position detecting method according to claim 1, wherein the map data generating step includes a substep of

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generating map data to display a position on the map image, which corresponds to the determined position, on the display to be distinguishable from other positions.

5 3. The specified position detecting method according to claim 1, wherein the predetermined three-dimensional field includes a plurality of areas, and the detecting step includes a substep of detecting which of the plurality of areas includes the detected point.

10 4. The specified position detecting method according to claim 3, wherein the map data generating step includes a substep of generating map data to display an area on the map image, which corresponds to the detected area, on the display to be distinguishable from other areas.

15 5. The specified position detecting method according to claim 1, wherein the predetermined three-dimensional field represents at least one of a ground surface and a water surface.

6. A game apparatus comprising:

20 a generator for generating map data to display a map image on a display of the game apparatus, the map image two-dimensionally expressing a corresponding three-dimensional map which includes information representing a predetermined three-dimensional field, generating cursor data to display a cursor on the displayed map image, and controlling a position of the displayed cursor in accordance with an instruction from an operator; and

25 a controller for executing game processing in accordance with a position on the displayed map image specified by the cursor, wherein the generator virtually disposes the three-dimensional

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map in parallel to the map image at a backward position thereof
seeing from a predetermined viewpoint, such that straight lines
extending from the predetermined viewpoint to given points on a
peripheral edge of the map image further pass through
5 corresponding points on a peripheral edge of the three-dimensional
map, projects the predetermined viewpoint onto the three-
dimensional map via a position of the cursor displayed on the map
image, and detects a point on the three-dimensional map where the
projected viewpoint intersects the predetermined three-dimensional
10 field, whereby determining the detected point as a position where
the cursor specifies on the displayed map image.

7. A storage medium having computer readable program code
means embodied in the medium, the computer readable program
code means comprising:

15 computer readable program code means for generating map
data to display a map image on a display of the game apparatus, the
map image two-dimensionally expressing a corresponding three-
dimensional map which includes information representing a
predetermined three-dimensional field;

20 computer readable program code means for generating cursor
data to display a cursor on the displayed map image;

computer readable program code means for controlling a
position of the displayed cursor in accordance with an instruction
from an operator;

25 computer readable program code means for virtually disposing
the three-dimensional map in parallel to the map image at a

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backward position thereof seeing from a predetermined viewpoint,
such that straight lines extending from the predetermined viewpoint
to given points on a peripheral edge of the map image further pass
through corresponding points on a peripheral edge of the three-
dimensional map;

computer readable program code means for projecting the
predetermined viewpoint onto the three-dimensional map via a
position of the cursor displayed on the map image; and

computer readable program code means for detecting a point on
the three-dimensional map where the projected viewpoint intersects
the predetermined three-dimensional field, whereby determining the
detected point as a position where the cursor specifies on the
displayed map image.

8. A computer program for a computer having a display, the
computer program causing the computer to execute the steps of:

generating map data to display a map image on a display of the
game apparatus, the map image two-dimensionally expressing a
corresponding three-dimensional map which includes information
representing a predetermined three-dimensional field;

generating cursor data to display a cursor on the displayed map
image;

controlling a position of the displayed cursor in accordance
with an instruction from an operator;

virtually disposing the three-dimensional map in parallel to the
map image at a backward position thereof seeing from a
predetermined viewpoint, such that straight lines extending from

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the predetermined viewpoint to given points on a peripheral edge of the map image further pass through corresponding points on a peripheral edge of the three-dimensional map;

5 projecting the predetermined viewpoint onto the three-dimensional map via a position of the cursor displayed on the map image; and

10 detecting a point on the three-dimensional map where the projected viewpoint intersects the predetermined three-dimensional field, whereby determining the detected point as a position where the cursor specifies on the displayed map image.

9. The computer program according to claim 8, wherein the computer program is stored in a computer readable storage medium.

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